

In the news

FAIR PLAY

Do we adhere to social rules because we fear the consequences of violating them? A recent article demonstrated that, in a variation of the ultimatum game, people are more likely to play fair if they are told that they might be punished for being unfair than if they know that no punishment will occur.

Increased fairness in the trials in which punishment was possible correlated with activity in the lateral orbitofrontal cortex (LOFC) and the right dorsolateral prefrontal cortex (DLPFC). People with Machiavellian characteristics changed their behaviour the most under the threat of punishment, and Jorge Moll, a neuroscientist at Rede Labs-D'Or in Rio de Janeiro, Brazil, found it most interesting that “the level of activity within the lateral orbitofrontal cortex is strongly related to Machiavellian personality style.”

(ScientificAmerican.com).

Both the LOFC and the DLPFC have previously been implicated in making moral judgments. Because the development of these areas continues until early adulthood, children and adolescents might not respond to (the threat of) punishment the way adults do. This could have implications for the criminal justice system. “It appears to be a bit like punishing the blind for not seeing,” said study author Manfred Spitzer of the University of Ulm, Germany. (ScienceNOW, 3 October 2007)

The identification of the neural network involved in social-norm compliance will contribute to our understanding of antisocial behaviour and personality disorders. It might also open the possibility of predicting people's behaviour by MRI scanning, which would have enormous societal consequences. According to Marcus Raichle of Washington University, St Louis, USA, “We might not be able to pull out individuals now, but the mere suggestion that you might one day be able to do that is important.” (ScienceNOW)

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